

5262a
5262b

U. S. COAST & GEODETIC SURVEY
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DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

Director

State: Alaska

DESCRIPTIVE REPORT

~~Topographic~~
Hydrographic

Sheet No. 5A-5B

5262a

5262b

LOCALITY

Resurrection Bay

Seward

1932

CHIEF OF PARTY

H. B. Campbell

DEPARTMENT OF COMMERCE

U. S. COAST AND GEODETIC SURVEY

HYDROGRAPHIC TITLE SHEET

REG. NO. 52622

The Hydrographic Sheet should be accompanied by this form, filled in as completely as possible, when the sheet is forwarded to the Office.

Field No. ~~5A-11~~

REGISTER NO. 52622

State ~~XXXX~~ Alaska
 General locality ~~XXXXXXXXXXXX~~ Kenai Peninsula
 Locality ~~XXXXXX~~ N.W. Portion of Resurrection Bay
 Scale 1/5,000 Date of survey Sept.-October, 1932
 Vessel Str. DISCOVERER
 Chief of Party H. B. Campbell
 Surveyed by R.J.Sipe, H.J.Healy, G.A.Nelson, J.N.Jones
 Protracted by E.E. Smith
 Soundings penciled by G. A. Nelson, H. F. Garber
 Soundings in fathoms ~~feet~~
 Plane of reference MLLW
 Subdivision of wire dragged areas by
 Inked by F.B. Kelly
 Verified by F.B. Kelly
 Instructions dated April 21, 1932
 Remarks:

DEPARTMENT OF COMMERCE
U. S. COAST AND GEODETIC SURVEY

REG. NO. 5262b

HYDROGRAPHIC TITLE SHEET

The Hydrographic Sheet should be accompanied by this form, filled in as completely as possible, when the sheet is forwarded to the Office.

Field No. 5B

REGISTER NO. 5262b

State Alaska

General locality Kenai Peninsula

Locality N. E. Portion of Resurrection Bay

Scale 1:5,000 Date of survey Sept. - Oct. 1932, 192

Vessel Discoverer

Chief of Party H. B. Campbell

Surveyed by R. J. Sips, H. J. Healy, G. A. Nelson, J. N. Jones

Protracted by E. E. Smith

Soundings penciled by G. A. Nelson, H. F. Garber

Soundings in fathoms XGCK

Plane of reference MLLW

Subdivision of wire dragged areas by

Inked by

Verified by

Instructions dated April 21, 1932, 192

Remarks:

GPO

Applied to CH 8528- Dec-1934. J. S. Sample

DESCRIPTIVE REPORT

to accompany

HYDROGRAPHIC FIELD SHEET #5A-5B

U.S.C. & G.S.S. DISCOVERER H. B. Campbell, Comdg.

Scale 1/5,000

Season 1932.

AUTHORITY

The survey was under the Director's Instructions dated April 21, 1932.

METHOD OF SURVEY

Motor sailers were used entirely in making this survey. The hand lead was used in general to a depth of twelve fathoms, and a wire sounding machine for greater depths. The hand lead was checked at the beginning and close of each day. The registering sheave was checked at the beginning and close of the season and found correct.

EXTENT OF SURVEY

This survey comprises the head of Resurrection Bay. It extends from the low waterline, to offshore unchangeable areas which was taken as the twenty fathom curve. Particular attention was paid to the area alongside and adjacent to the wharves.

WHARVES AND ANCHORAGES

Anchorage may be had in twenty fathoms, mud bottom, 250 meters, NNE Magnetic (60° True) from the center of the San Juan Fisheries Dock.

A breakwater has been built about 200 meters north of the San Juan Fisheries Dock, which provides shelter for small craft, which was dredged to a controlling depth of 2-1/2 fathoms at MLLW. The end of the breakwater is marked by a fixed green light, (Signal Aid).

The following wharves were sounded for controlling depths:

<u>Wharf</u>	<u>Controlling Depth at MLLW.</u>
San Juan Fisheries Dock	25 feet
Alaska Railroad Dock	30 "
Local Cannery Dock	4 "
Standard Oil Dock	34 "

*above depths to be verified in office
#156.*

STATISTICS

(See attached sheet for statistics.)

*Report written by Gen. Nelson.
Respectfully submitted
W. H. Bean
H. & G. Eng*

STATISTICSHYDROGRAPHIC
SHEET # 5A

5262a

Vessel	Date	Day	No.	No. of Sdgs.		Stat. Miles Sdgs.	
			Pos.	H.L.	Wire	H. L.	Wire
S.M.S.	8/16/32	a	131	398	57	6.2	1.0
"	9/6/32	b	204	419	124	9.8	1.7
"	9/7/32	c	216	291	213	6.7	5.0
"	10/5/32	d	122	367	171	3.0	5.0
Total			673	1475	565	25.7	12.7

SHEET #B

5262b

S.M.S.	10/3/32	a	141	523	112	9.3	3.9
"	10/4/32	b	137	289	188	4.9	4.9
Total			278	812	300	14.2	8.8

Area, square statute miles -----Sheet 5A ---- 1.0

" " " " ----- " 5B ---- 0.7

APPROVAL

by

CHIEF OF PARTY

The field work and the accompanying records and sheets were done under my supervision. No further work is considered necessary in this area.

attention is called to the advisability of recommending anchorage in 25 fms midway between the San Juan dock and the power house discharge -

Respectfully forwarded:

H. B. Campbell

H. B. Campbell,

Chief of Party.

May 11, 1933

Division of Hydrography and Topography:

✓ Division of Charts:

Tide Reducers are approved in
3 volumes of sounding records for

HYDROGRAPHIC SHEET 5262 a

Locality Seward Harbor, Resurrection Bay, S. W. Alaska

Chief of Party: H. B. Campbell in 1932

Plane of reference is mean lower low water, reading
2.6 ft. on tide staff at Seward

14.9 ft. below B. M. 1 a

Height of mean higher high water above plane of reference is
10.6 feet.

Condition of records satisfactory except as checked below:

1. Locality and sublocality of survey omitted.
2. Month and day of month omitted.
3. Time meridian not given at beginning of day's work.
4. Time (whether A.M. or P.M.) not given at beginning of day's work.
5. Soundings (whether in feet or fathoms) not clearly shown in record.
6. Leadline correction entered in wrong column.
7. Field reductions entered in "Office" column.
8. Location of tide gauge not given at beginning of day's work.
9. Leadline corrections not clearly stated.
10. Kind of sounding tube used not stated.
11. Sounding tube No. entered in column of "Soundings" instead of "Remarks".
12. Legibility of record could be improved.
13. Remarks.

H. Armarner
Actg Chief, Division of Tides and Currents.

May 11, 1933

Division of Hydrography and Topography:

✓ Division of Charts:

Tide Reducers are approved in
2 volumes of sounding records for

HYDROGRAPHIC SHEET 5262 b

Locality Seward Harbor, Resurrection Bay, S. W. Alaska

Chief of Party: H. B. Campbell in 1932

Plane of reference is mean lower low water, reading

2.6 ft. on tide staff at Seward

14.9 ft. below B. M. 1 a

Height of mean higher high water above plane of reference is 10.6 ft.

Condition of records satisfactory except as checked below:

1. Locality and sublocality of survey omitted.
2. Month and day of month omitted.
3. Time meridian not given at beginning of day's work.
4. Time (whether A.M. or P.M.) not given at beginning of day's work.
5. Soundings (whether in feet or fathoms) not clearly shown in record.
6. Leadline correction entered in wrong column.
7. Field reductions entered in "Office" column.
8. Location of tide gauge not given at beginning of day's work.
9. Leadline corrections not clearly stated.
10. Kind of sounding tube used not stated.
11. Sounding tube No. entered in column of "Soundings" instead of "Remarks".
12. Legibility of record could be improved.
13. Remarks.

Hammer
Acty Chief, Division of Tides and Currents.

Field Records Section (Charts)

HYDROGRAPHIC SHEET No. *5262.a*

The following statistics will be submitted with the
cartographer's report on the sheet:

Number of positions on sheet	<i>673.</i>
Number of positions checked	<i>54</i>
Number of positions revised	<i>10</i>
Number of soundings recorded	<i>2040.</i>
Number of soundings revised	<i>52</i>
Number of signals erroneously plotted or transferred	<i>2</i>

Date: *September 1, 1933*

Cartographer: *Francis B. Kelly*

Field Records Section (Charts)

HYDROGRAPHIC SHEET No. 5262 ^b

The following statistics will be submitted with the
cartographer's report on the sheet:

Number of positions on sheet	278
Number of positions checked	33
Number of positions revised	8
Number of soundings recorded	1112
Number of soundings revised	4
Number of signals erroneously plotted or transferred	✓

Date: Aug. 28, 1933
Cartographer: Alexis M. Uzefovich

Section of Field Records
Report on Hyd. Sheet H-5262a
N. W. Portion of Resurrection Bay
Kenai Peninsula, Alaska.

Chief of Party - W. B. Campbell
Surveyed by - R. J. Sipe, H. J. Nealy, H. A. Nelson & J. H. Jones
Protected by - E. L. Smith
Sdgs. pencilled by - H. A. Nelson & H. F. Garber
Sdgs. verified & ruled by - F. B. Kelley

1. The records conform to the General Instructions, Exceptions: No indication of how close to ^{the} docks the first line of soundings was taken. No cuts were taken to establish the position of \odot Corn which appears on the Boat Sheet & Inset Sheet but not on the ~~Hyd~~ Topographic Sheet. This is marked on the Boat sheet as "End of Dock - a.L.S."
2. The plan and character of development ~~satisfies~~ fulfill the requirements of the General Instructions. Exception: If the 10 fathom shoal off Sta \odot Fry is correctly located, which is doubtful, then more development should have been done.
3. The plan and extent of the development satisfy the specific dist.
4. There were no sounding line crossings, except in the basin north of the breakwater.
5. The usual depth curves can be almost completely drawn. \odot : 0, 1, 2, & 3 fathom curves are ~~plotted~~ in some isolated spots.
6. The field plotting was completed except that the soundings alongside the various docks were not plotted. The ~~reasoner~~ ^{verifier} drew the docks to a large scale (1:2000) & plotted the significant soundings.
7. Some of the field drafting had to be done over in the ~~field~~ ^{office} due to erroneous plotting of fixes, wrong spacing of soundings due to completely ignoring time intervals recorded. The fractions used, conformed

7 (contd)

in general to the Hyd. Manual, except that in quite a few cases 5 feet was called the lower fathom instead of the higher. The erroneous transference of signals O Chi & Oax from the Topo Sheet T-4733 caused the improper placing of two fixes.

8. The junctions with adjoining sheets are poor showing differences of from 1 to 10 fathoms.

9. Signals were so poorly chosen that trouble was constantly experienced both in the field & while plotting the smooth sheet. The signals chosen not only sounded alike but when written looked alike.

There is no authority for the location of O Corn except the Boat Sheet.

Signal O Kam on T-4733 was transferred to the Boat Sheet & the Smooth Sheet as O Ram.

Sounding lines off Δ Sand show discrepancies. Soundings in area $60^{\circ}06'40''$ & $149^{\circ}25'45''$ are doubtful.

The 10 fathom shoal off O Fry on R.R. Block is probably in error. The substitution of O ^{Com} Fry for O ^{Fry} Corn as the center object is suggested (Fix 67 b).

The location of the Red Run Bays was taken from T-4733.

10. Rating of work - Poor

Francis B. Kelly

Sept 1, 1937.

Section of Field Records

Report on Hydrographic Sheet No. 5262^b

Chief of Party H. B. Campbell Surveyed by R. J. Sipe,
H. J. Healy, G. A. Nelson, J. N. Jones
Protracted by E. E. Smith Soundings plotted by G. A.
Verified and inked by A. M. Uzefovich Nelson, H. F. Garber

1. The records conform to the requirements of the General Instructions.
2. Depth curves are completely drawn.
3. The field plotting was completed to the extent prescribed in General Instructions.
4. The office draftsman did not have to do over any part of the drafting done by the field party.
5. The junction with adjacent sheet H 5262^a is satisfactory.
6. Remarks: The Red Nun buoy on the left hand side of the sheet ^{was} transferred from T-4732.
The quality of the work is good.

Respectfully submitted
Alexis M. Uzefovich
Aug. 28, 1933

SECTION OF FIELD RECORDS

Report on H. 5262 a and b.
Resurrection Bay, Alaska.

Surveyed in 1932

Instructions dated April 21, 1932 (Discoverer)

Chief of Party - H. B. Campbell.

Surveyed by - Various Officers.

Protracted by - E. E. Smith.

Soundings plotted by - G. A. Nelson and H. F. Garber.

Verified and inked by - F. B. Kelly (5262a); A. M. Uzefovich (5262b).

1. Records.

The records conform to the requirements of the Hydrographic Manual with the following exceptions:

a. In the "stop" soundings it was impossible to tell what the actual running time was. It is frequently of material interest to know the actual distance covered in a given interval of time, and while it is not recommended that the sounding records contain such information as the time when the launch got underway, the time when she was running at full speed, the time when the engine was stopped, and the time when the sounding was taken, it would be very helpful in many cases if the descriptive report contained a statement as to the general procedure followed in such cases.

b. Where a large number of signals are established close together along a featureless shore, it would appear that each one should be characteristically marked and the boat sheet should contain brief descriptions of such signals to enable the hydrographer to quickly identify them. This is particularly necessary where lines are run parallel to the shore, since they do not always begin and end in close proximity to the signals and hence make for uncertainty in their identification.

c. The use of similar sounding names, such as, "Tem" and "Ram", "Oat" and "Eat", "Zeb" and "Feb", (see H. 5262a) for signals close together is always objectionable and generally leads to confusion both in the field and in the office.

2. Specific Instructions.

The work is in conformity with the specific instructions both as to scale and extent.

3. Depth Curves.

With the exception of several small sketches close inshore, the usual depth curves can be completely drawn.

4. Comparisons with Previous Surveys.

A comparison has been made between H. 5262a and H. 4678 (surveyed in 1927)

and it was found that in the deeper areas northward of L at. 60°05'.30 the present survey is from 1 to 8 fathoms shoaler than the 1927 survey, while in the vicinity of Lowell Pt. the agreement is generally good. No explanation could be advanced for these differences. The sounding machine was used on both surveys. It is not believed that any such radical changes have taken place in the deeper areas between the dates of the last two surveys. This view is substantiated by the very fine agreement between the 1905 survey (H. 2761) and the present surveys (H. 5262, a and b). Since the 1927 survey (H. 4678) shows numerous soundings deeper than either the 1905 or the 1932 surveys, the probable explanation is that the machine soundings on the 1927 survey were not always truly vertical. It is therefore recommended that for charting purposes the present survey (H. 5262a) supersede that part of the 1927 survey (H. 4678) that lies northward of lat. 60°05'.30" and that for the area outside the limits of the present survey, the soundings from H. 2761 (survey of 1905) be used.

To the southward of lat. 60°05'.30" there is a general good agreement between the two 1927 surveys H. 4678 and H. 4827 as well as with the 1905 survey (H. 2761). In compiling the chart in this area, soundings from these various sources may be used as needed.

5. Field drafting.

The usual amount of field drafting was accomplished but was found defective in that on H. 5262a a number of 3 point fixes were erroneously plotted, two signals Chi and Ax were erroneously transferred from the topographic sheet and that a number of soundings were erroneously spaced due to ignoring of the irregular time intervals in the plotting.

6. Additional Work.

No additional work is recommended within the area covered by this survey (H. 5262a and b).

7. Reviewed by A. L. Shalowitz, September, 1933.


Chief, Field Records Section.


Chief, Field Work Section.

Examined and approved:


Chief, Division of Charts.


Chief, H. & T. Division.

Applied to insert on CN 8529 - Oct. 1940 J.S.B.